

CLAIMS

1. A telecommunication apparatus (10) having a radio interface (24, 43), a controller (44), a memory (45), an input device (46) and an output device (47), the controller being arranged to provide a man-machine interface (48) to a user (49) through the input and output devices, the memory comprising a phonebook (40-42) capable of storing a plurality of phonebook entries, each entry representing a respective subscriber and an associated telephone number, the phonebook being accessible through the man-machine interface, characterized in that

the phonebook (40-42) is capable of storing, for at least one of the phonebook entries, information (42) about an operational status of a respective subscriber; and

the controller (44) is adapted to update the operational status information of the at least one phonebook entry in response to status data, which are received through the radio interface (24, 43).

2. A telecommunication apparatus as in claim 1, wherein the operational status information may represent a situation, where the respective subscriber is currently participating in an ongoing telephone call ("Busy").

3. A telecommunication apparatus as in claim 1 or 2, wherein the operational status information may represent a situation, where the respective subscriber is currently not participating in any ongoing telephone call and is operatively accessible ("Available").

4. A telecommunication apparatus as in claim 3, wherein the controller (44) is adapted, in response to receiving status data to the effect that the situation in claim 3 has occurred, to provide an indication to the user through the output device (47).

5. A telecommunication apparatus as in claim 4, wherein the output device (47) is a display, an indication lamp, a loudspeaker (25) or a vibrator.

5 6. A telecommunication apparatus as in any preceding claim, wherein the operational status information may represent a situation, where the respective subscriber is not operatively accessible ("Not available").

10 7. A telecommunication apparatus as in any preceding claim, wherein the operational status information may represent a situation, where the respective subscriber is currently using call diversion ("Diverted").

15 8. A telecommunication apparatus as in any preceding claim, wherein the telecommunication apparatus is a mobile telephone.

20 9. A telecommunication apparatus as in any preceding claim, wherein the radio interface (24, 43) is adapted to receive short text messages, such as SMS ("Short Messages Services") or MMS ("Multimedia Messaging Service") messages, and wherein the status data is comprised in such a short text message.

25 10. A telecommunication apparatus as in any preceding claim, wherein the radio interface (24, 43) is adapted to receive the status data on a data channel in a digital telecommunications system, such as a USSD ("Unstructured Supplementary Service Data") channel in a GSM ("Global System for Mobile communication") system.

35 11. A telecommunication apparatus as in any preceding claim, wherein the radio interface (24, 43) is adapted to receive the status data over a GSM, GPRS ("General Packet

Radio Service") or UMTS ("Universal Mobile Telephone System") network.

12. A telecommunication apparatus as in any preceding
5 claim, further comprising functionality for accessing a
global area network, such as the Internet, wherein the
status data is received over said global area network.

13. A telecommunication apparatus as in claim 12,
10 further comprising a WAP ("Wireless Application Protocol")
client, by means of which the status data is received.

14. A method of operating a telecommunications net-
work (30) involving a plurality of subscribers of mobile
15 telecommunications services, characterized by the steps
of:

providing an option for an individual subscriber to
select at least one other subscriber,

keeping record of the selected subscriber,
20 determining an operational status of the selected
subscriber, and

transmitting the determined operational status to
the individual subscriber.

25 15. A method as in claim 14, wherein the operational
status may reflect any of the following situations: the
respective subscriber is participating in an ongoing tele-
phone call ("Busy"); the respective subscriber is not par-
ticipating in any ongoing telephone call and is operatively
30 accessible to the telecommunications network (30) ("Avail-
able"); the respective subscriber is not operatively acces-
sible to the telecommunications network ("Not available");
or the respective subscriber is currently using call diver-
sion ("Diverted").

16. A method as in claim 14 or 15, wherein the determined operational status is transmitted in a short text message, such as an SMS or MMS message.

5 17. A method as in claim 14 or 15, wherein the determined operational status is transmitted over a data channel in a digital telecommunications system, such as a USSD channel in a GSM system.

10 18. A method as in claim 14 or 15, wherein the determined operational status is transmitted according to a communications protocol, such as WAP for accessing a global area network, such as the Internet.

15 19. A method as in claim 14 or 15, wherein the determined operational status is transmitted over a GPRS or UMTS network.

20 20. A telecommunication apparatus (10) for use in a telecommunications network (30), the apparatus having a radio interface (24, 43), a controller (44), a memory (45), a man-machine interface (48) to a user (49) of the telecommunication apparatus, and a digital message service application (45b) capable of communicating a digital message
25 (81) to a remote telecommunication apparatus (14a) through the radio interface (24, 43) and the telecommunications network (30), characterized by

first means (101) for receiving a request (71) to check an operational status of the remote telecommunication
30 apparatus (14a), said request being submitted by the user (49) through the man-machine interface (48);

second means (101) for reading a first record (102) to identify the remote telecommunication apparatus;

third means (104) for generating a first digital
35 message (81), wherein said first digital message contains

said first record as well as a second record (103) to identify said telecommunication apparatus (10);

fourth means (105) for causing the digital message service application (45b) to send said first digital message to the remote telecommunication apparatus;

fifth means (105) for receiving a second digital message (82) from the remote telecommunication apparatus;

sixth means (106) for determining the operational status of the remote telecommunication apparatus from the second digital message; and

seventh means (107) for indicating the determined operational status of the remote telecommunication apparatus to said user through the man-machine interface.

21. A telecommunication apparatus as in claim 20, wherein the second digital message (82) is a reply to the first digital message and contains a data field to indicate that the remote telecommunication apparatus (14a) is connected to the telecommunications network (30).

22. A telecommunication apparatus as in claim 21, wherein said data field indicates that the remote telecommunication apparatus (14a) is involved in an ongoing telephone call ("Busy").

23. A telecommunication apparatus as in claim 21, wherein said data field indicates that the remote telecommunication apparatus (14a) is not involved in an ongoing telephone call and is therefore operatively accessible ("Available").

24. A telecommunication apparatus as in any of claims 20-23, wherein said first record (102) represents a telephone number of the telecommunication apparatus (10).

25. A telecommunication apparatus as in any of claims 20-24, wherein said second record (103) represents a telephone number of the remote telecommunication apparatus (14a).

26. A telecommunication apparatus as in any of claims 20-25, wherein said seventh means (107) is adapted to provide the indication of the determined operational status of the remote telecommunication apparatus (14a) to said user (49) through a display (26, 47), an indication lamp, a loudspeaker (25) or a vibrator.

27. A telecommunication apparatus as in claim 21, wherein said data field indicates that the remote telecommunication apparatus (14a) is involved in call diversion ("Diverted") or call forwarding ("Call forward").

28. A telecommunication apparatus according to any of claims 20-27, wherein the telecommunication apparatus is a mobile telephone.

29. A telecommunication apparatus as in any of claims 20-28, wherein said first digital message (81) and said second digital message (82) are short text messages, such as SMS or MMS.

30. A telecommunication apparatus as in any of claims 20-28, wherein said first digital message (81) and said second digital message (82) are transferred over a GPRS or UMTS network.

31. A method of communicating operational status information between a first telecommunication apparatus (10) and a second telecommunication apparatus (14a) in a telecommunications network (30), characterized by the steps of:

through a man-machine interface (48) of the first telecommunication apparatus (10), receiving (71) a request from a user (49) of the first telecommunication apparatus to check an operational status of the second telecommunication apparatus (14a);

in response to receiving said request from said user, generating a first digital message (81);

sending (72) said first digital message to the second telecommunication apparatus;

receiving (91) said first digital message in said second telecommunication apparatus;

in said second telecommunication apparatus, generating a second digital message (82), containing an indication of the operational status of the second telecommunication apparatus;

sending (93) said second digital message to the first telecommunication apparatus;

receiving (73) said second digital message in the first telecommunication apparatus; and

in the first telecommunication apparatus, providing (75) a notification to said user concerning the operational status of the second telecommunication apparatus, as indicated in said second digital message.

32. A method according to claim 31, comprising the further step of checking (92), in the second telecommunication apparatus (14a), whether the first telecommunication apparatus (10) is an admissible requestor of operational status information regarding the second telecommunication apparatus.

33. A method according to claim 31 or 32, wherein said second digital message (82) comprises a time stamp representative of a creation time of said second digital message, the method comprising the further step of deter-

mining (74), in said first telecommunication apparatus
(10), whether a difference between a current time and said
time stamp is less than a predetermined limit and, if not,
sending (72) a new first digital message (81) to the
5 second telecommunication apparatus (14a).

34. A method according to any of claims 31-33, where-
in said step of providing (75) an indication to said user
(49) of the operational status of the second telecommunica-
10 tion apparatus (14a) is done through a display (26, 47), an
indication lamp, a loudspeaker (25) or a vibrator in the
first telecommunication apparatus.